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A CATALOGUE OF THE TYPES KEPT IN THE COLLECTIONS  
OF MUSEO CIVICO DI STORIA NATURALE DI MILANO.

VIII. TYPES OF DECAPOD CRUSTACEA (ANNOTATED CATALOG)

**Abstract.** — The Collections of the Museo Civico di Storia Naturale in Milano at present include types of 54 species of Decapod Crustacea, mostly from Far East areas. This material is listed with remarks on the systematic status of some species and figures of some types. A Lectotype is selected for *Callianassa pestae* De Man.

**Riassunto.** — Catalogo dei Tipi del Museo Civico di Storia Naturale di Milano.  
VIII. I Tipi dei Crostacei Decapodi (Catalogo commentato).

Le collezioni zoologiche del Museo civico di Storia Naturale di Milano attualmente includono i Tipi di 54 specie di Crostacei Decapodi, principalmente dell'estremo oriente. Viene presentato un catalogo del materiale esaminato, con annotazioni sulla posizione sistematica di alcune specie e figure di alcuni tipi. Infine viene stabilito il Lectotipo di *Callianassa pestae* De Man.

Following recommendation 72 D of the International Code of Zoolo-gical Nomenclature (1964) a list of Decapod Crustacean Types held in the Museo Civico di Storia Naturale of Milano is herein presented.

The format partly follows that of KENSLEY (1974). Families are arranged according to BOWMAN & ABELE (1982) and within families genera and species are listed alphabetically. Each species is followed by author's name, year of publication, journal, volume, page and figure numbers; if a valid species has been transferred from the original to another genus, the current name is placed in square brackets.

If, as a result of revision of a taxonomic group, the name under which the species was first described has since been submerged, current name and authority are placed in round brackets, and the reviser's name

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is quoted in the Remarks. When more than one specimen was studied by an author and a holotype was not chosen, the specimens are considered to be syntypes.

Specimen size is reported as carapace length (c.l.) measured from eye socket to postero-median margin of carapace in Natantia and Reptantia Macrura and from front or tip of rostrum to posterior carapace border in Reptantia Anomura and Brachyura.

#### **Historical remarks on decapod collections.**

The largest number of undescribed decapods came from the Owston collection of Japanese decapods, studied by PARISI (1914-1919). Other undescribed Decapods were named from material collected in the same period on behalf of Milano Museum in the Mediterranean area and former Italian colonies.

Parisi actively worked in the Milano Museum in the period 1910-1951 and considerably increased the Decapod collections. In this period also paratypes of species described from the Far East area by other scientists were deposited in the museum's collections. Other paratypes were obtained through exchange agreements with other scientific institutions.

Unfortunately in August 1943 an air bombing and a fire severely damaged the museum building; part of the library and some important collections were destroyed. Also Parisi's office was destroyed and probably at that time the types of *Mursia armata trispinosa* Parisi, 1914 and *Callianassa italica* Parisi, 1915, which we could not find in the present collection, were lost. This event was a tremendous shock for Dr. Parisi who subsequently devoted himself to the reconstruction of the Museum (MOLTONI, 1957).

Parisi's scientific work remains a fundamental one for all scientists working on northwestern Pacific decapods and we dedicate to his memory this list of types.

#### **List of types.**

##### **Family PENAEIDAE**

*Penaeus semisulcatus paucideniatus* Parisi, 1919  
(*Penaeus semisulcatus* de Haan, 1850)

PARISI, 1919 - *Atti Soc. Ital. Sc. nat.* Milano, 58: 65, pl. 5 fig. 5.

Holotype: Cat. 22 (ex 1667), female c.l. 44.5 mm.

Locality: Misaki, Sagami bay, Japan.

Collected by: A. Owston, February 14, 1905.

*Remarks:* Only the rostral formula (7/1) differentiates this specimen from another specimen of *P. semisulcatus* collected at the same locality. It is highly probable that it is only a malformed specimen.

#### Family PALAEMONIDAE

*Macrobrachium scortecii* Paulucci Maccagno, 1961

PAULUCCI MACCAGNO, 1961 - *Atti Soc. Ital. Sc. nat. Milano*, 100 (3): 336, pl. 17 figs 1-14, pl. 18 figs 5-8.

Syntypes: Cat. 10, 4 males c.l. 7.5-17mm, 4 females, c.l. 16.3-19.5 mm; Cat. 11, 5 males c.l. 7-26 mm, 6 females, c.l. 16-21.1 mm, (majority of specimens are incomplete, several pereiopods are on the bottom of the two jars).

Locality: Cal Galloan, right side of the Uadi Baad, Migiurtinia, Somalia.

Collected by: G. Scortecci, July 27, 1957.

*Remarks:* Paulucci Maccagno (1961) already noted that the present species is close to *M. scabriculum* (Heller), an extremely variable form already



Fig. 1. — *Macrobrachium scortecii* Paulucci Maccagno, 1961 (syntypes): a) cephalic region in lateral view, male c.l. 17 mm; b) chela of left 2nd pereiopod, male c.l. 17 mm.

reported from Somalia as *Palaemon dolichodactylus* (VATOVA, 1943, pg. 12, pl. 1 fig. 3).

The lower number (1-2) of teeth on the ventral margin of rostrum, its smaller size (does not reach distal margin of second joint of antennular peduncle) (fig. 1a) and the shape of the chela of the 2nd pereiopod (fig. 1b) (see also PAULUCCI MACCAGNO, 1961, pl. 17 fig. 2) are the main distinctive characters of the species.

Two females of the type series (cat. 11) are ovigerous, eggs diameter is about 0.5 mm.

*Palaemon asperulus* var. *brevirostris* Yu, 1931

[*Macrobrachium asperulum brevirostris* (Yu)]

YU, 1931 - *Bull. Soc. zool. France*, 56: 287, fig. 4.

Syntype: Cat. 17 (ex 2247), female, c.l. 10 mm.

Locality: Ichang, Hupei province, China.

*Remarks:* The dactyli of the walking legs (Fig. 2c) are shorter than in the nominal species, but the present specimen is a female and cannot help to solve the question about the validity of *Macrobrachium asperulum brevirostris* (see HOLTHUIS, 1950, pag. 196).

Prof. Yu presented the Museum with this specimen (PARISI, 1934).

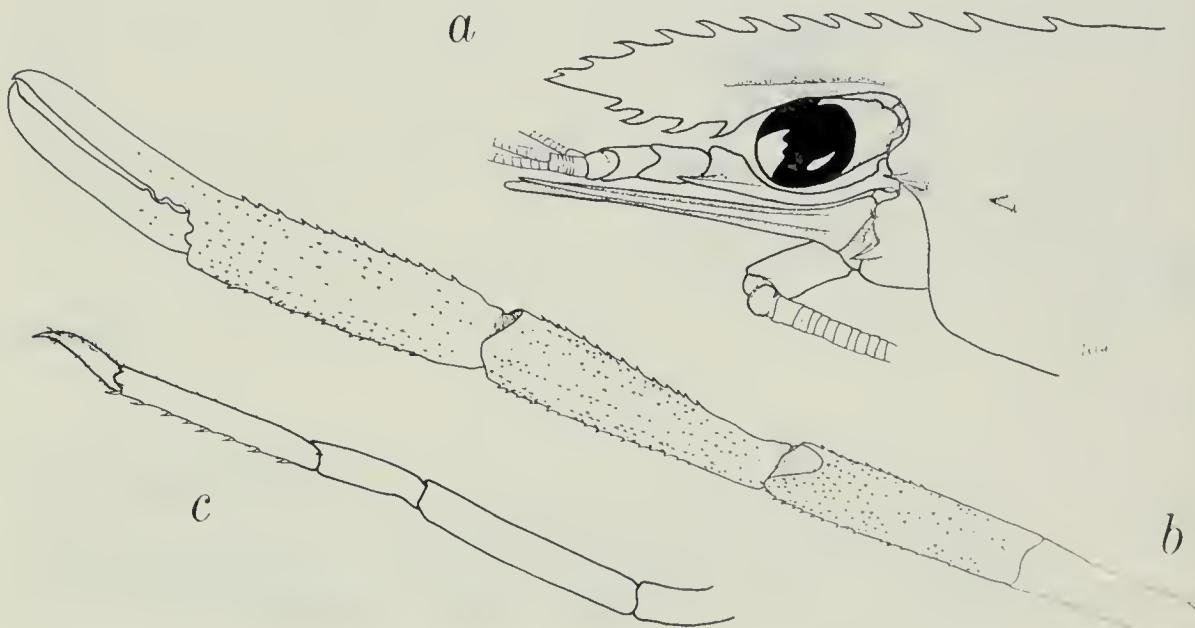


Fig. 2. — *Palaemon asperulus brevirostris* Yu, 1931, female c.l. 10 mm (syntype):  
a) cephalic region in lateral view; b) 2nd pereiopod; c) 4th pereiopod.

*Palaemon hainanense* Parisi, 1919  
[*Macrobrachium hainanense* (Parisi)]

PARISI, 1919 - *Atti Soc. ital. Sc. nat.* Milano, 58: 87, pl. 3 fig. 1, pl. 6 figs 1 and 7.

Holotype: Cat. 1223 (ex 1707), male c.l. 24.5 mm (left second pereiopod detached).

Paratypes: Cat. 1223 (ex 1707), 2 males c.l. 14.3, 22.8 mm (smaller lacks pereiopods 2nd and 3rd, its rostrum has four teeth on the lower border).

Locality: Keng-kong river, Is. Hainan.

Collected by: A. Owston, June 1903.

Remarks: Parisi selected as « tipo » the larger specimen. Holotype and paratypes are in the same jar.

*Palaemon insularis* Parisi, 1919  
[*Macrobrachium insulare* (Parisi)]

PARISI, 1919 - *Atti Soc. ital. Sc. nat.* Milano, 58: 85, textfig. 7, pl. 3 figs 2-3, pl. 6 fig. 12.

Syntypes: Cat. 18 (ex 1709), 6 males c.l. 13-24.2 mm, 3 females c.l. 16-18.5 mm.

Locality: Formosa.

Collected by: A. Owston.

Remarks: Only the bigger male (c.l. 24.2 mm) with asymmetrical second pereiopods (see PARISI, 1919, pl. 3 fig. 3) seems to be a « full grown » male. A male (c.l. 18.5 mm) in the type series lacks the hepatic spine on the left side.

Some specimens lack one or more pereiopods and some have the detached second pereiopods fastened to the abdomen.

*Palaemon kiukianensis* Yu, 1931  
[*Macrobrachium kiukianense* (Yu)]

YU, 1931 - *Bull. Soc. zool. France*, 56: 279, fig. 1 A, B, C.

Syntype: Cat. 19 (ex 2244), female c.l. 15.3 mm (tip of rostrum broken, lacks pereiopods 3rd and 4th on left side and 2nd, 3rd and 4th on right side).

Locality: Kiukiang, Kiansi province, China.

Remarks: The specimen has to be the larger female reported by YU (1931) in his table of measurements; he presented this specimen to the Museum (PARISI, 1934).

*Palaemon venustus* Parisi, 1919  
 [Macrobrachium venustum (Parisi)]

PARISI, 1919 - *Atti Soc. Ital. Sc. nat. Milano*, 58: 82, pl. 4 fig. 1, pl. 6 figs 5 and 13.

Syntypes: Cat. 1527 (ex 1708), 4 males c.l. 15-17.2 mm, 1 female c.l. 13.3 mm (smaller male has the abdomen partly detached from the carapace and lacks second pereiopods, the female lacks the 4th pereiopods).

Locality: Is. Hainan.

Collected by: A. Owston, February 1903.

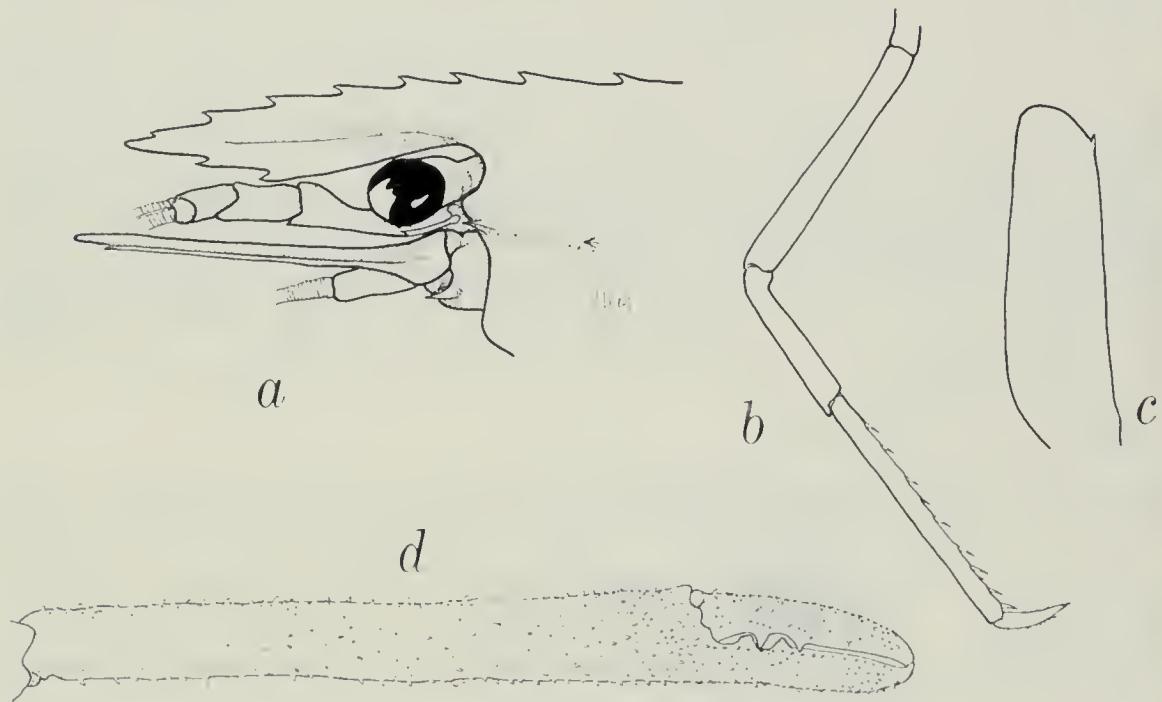


Fig. 3. — *Palaemon venustum* Parisi, 1919, male c.l. 17 mm (syntype): a) cephalic region in lateral view; b) 3rd pereiopod; c) scaphocerite; d) chela of 2nd pereiopod.

*Remarks:* In males the second pereiopods are subequal, their dactyli are not high and compressed as appears from the original drawing (PARISI, 1919, pl. 6 fig. 5). We figure here the chela of the right second pereiopod of the bigger male (Fig. 3d).

On page 82 of Parisi's article appears the specific name *vernustus* but it is obviously a typographical error because plates of the same article and the original label in the jar bear the correct name *venustus*.

*Typhlocaris lethaea* Parisi, 1921

PARISI, 1921 - *Atti Soc. ital. Sc. nat. Milano*, 59: 241, figs 1-5.

Syntypes: Cat. 43 (ex 1825), 4 males c.l. 23.0-29.0 mm, 4 females c.l. 8-27.5 mm.

Locality: Grotta del Lete (Giok-Kebir), 10 Km East of Bengazi (Libya). Collected by: V. Zanon.

*Remarks:* Parisi received several lots of *T. lethaea*; the jar labelled « cotipi » now includes 4 males and 4 females; measurements of some specimen do not agree with those reported in the original description (see: PARISI, 1921, pag. 245).

## Family PROCESSIDAE

*Nika mediterranea* Parisi, 1915

(*Processa canaliculata* Leach, 1815)

PARISI, 1915 - *Monitore zool. ital.*, 26: 65.

Holotype: Cat. 1792 (ex 1420), female ovigerous, c.l. 17.9 mm (rostrum broken at base, abdomen detached).

Locality: Nizza, Ligurian sea.

Collected by: Bellotti, 1875.

*Remarks:* Recent examination of the holotype of *P. canaliculata* in the British Museum showed that: « it did not belong to the species described under that name by NOUVEL and HOLTHUIS (1957), but to their *P. mediterranea* » (AL-ADHUB and WILLIAMSON, 1975).

Therefore Mediterranean specimens identified with *P. mediterranea* after the publication of NOUVEL and HOLTHUIS monograph on European Processidae (1957) actually belong to *P. canaliculata* Leach whereas specimens identified with *P. canaliculata* belong to a different species: *P. nouveli nouveli* Al-Adhub and Williamson, 1975.

## Family NEPHROPIDAE

*Nephrops sagamiensis* Parisi, 1917

[*Metanephrops sagamiensis* (Parisi)]

PARISI, 1917 - *Atti Soc. ital. Sc. nat. Milano*, 56: 15.

Syntypes: Cat. 12-13 (ex 1494), 2 females c.l. 46, 56 mm (the smaller, Cat. 12, is ovigerous and has the left cheliped detached).

Locality: Sagami bay, Japan.

Collected by: A. Owston, 1914.

*Remarks:* JENKINS (1972) restricted the genus *Nephrops* to include only *N. norvegicus* (Eastern Atlantic, Mediterranean); all species presently known from the Indo-Pacific area pertain to his new genus *Metanephrops*.

### Family AXIIDAE

*Oxyrhynchaxius japonicus* Parisi, 1917

PARISI, 1917 - *Atti Soc. Ital. Sc. nat. Milano*, 56: 18, figs 5A-C, 6.

Holotype: Cat. 15 (ex 1527), male, c.l. 20 mm.

Locality: Enoshima, Japan.

Collected by: A. Owston, March 30, 1905.

*Remarks:* The cornea, with evident ommatidia, is darker than the ocular peduncle; that makes Parisi's statement that eyes are unpigmented in the genus *Oxyrhynchaxius* questionable.

De MAN (1925) considers the validity of that genus doubtful.

To Parisi's original description we add a figure (Fig. 4) of the side view of the cephalic region of the holotype and leave to other specialists the task to solve this question.

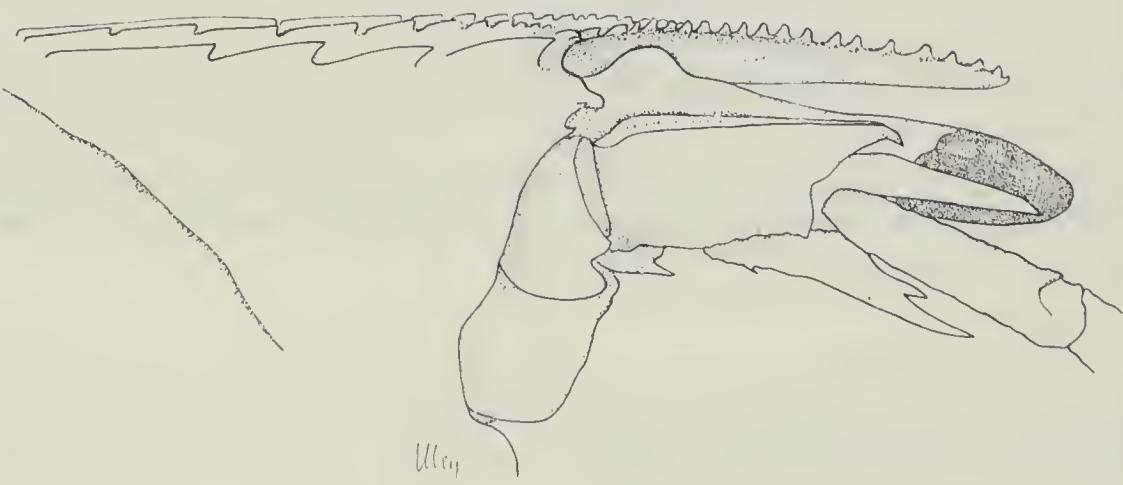


Fig. 4. — *Oxyrhynchaxius japonicus* Parisi, 1917 male c.l. 20 mm (holotype): cephalic region in lateral view.

## Family CALLIANASSIDAE

*Callianassa pestae* De Man, 1928DE MAN, 1928 - *Capita zoologica*, 2 (6): 34, figs 16-16e.

Lectotype: Cat. 1 (ex 58), female, c.l. 14 mm (larger cheliped and pereiopods 3rd and 5th of the left side detached, abdominal segments 1 and 2 partly crushed).

Paratypes: Cat. 1389 (ex 2115), male « half grown », c.l. 9.7 mm; Cat. 1390 (ex 2114), 1 male (badly smashed, unmeasurable), 1 juvenile c.l. 5.2 mm.

Locality: The lectotype comes from Venezia (Bellotti collegit, 1857); the other two paratypes were collected in the Eastern Adriatic (cat. 1389) and in the Gulf of Napoli (cat. 1390).

Remarks: The type series included: « . . . a full-grown male, long 58 mm, and a young male, long 26 mm, taken at Naples in June respectively July 1914, the half-grown male from the Eastern Adriatic, the two females from Venezia collected in 1871 (original label bears date 1857) and the two young females from Lesina » (DE MAN 1928). The last two specimens were sent to De Man by Balss (Munich) whereas all the others were loaned by Parisi (Milano).

We could trace all of Parisi's material, but only the specimen from Venezia bears the label « cotipi »; the others have a label marked « n. sp. ». All of the specimens are in poor condition; herein we select the Venezia specimen as the lectotype of *Callianassa pestae*; the other specimens are considered paratypes.De SAINT LAURENT & BOZIC (1973) consider *C. subterranea* forma *pontica* Czerniavsky, 1884 the oldest available name for the present species. HOLTHUIS (1953) and MANNING and STEVCIC (1982) claim that, according to the International Code of Zoological Nomenclature, the epithet *pontica* Czerniavsky has no status and is not to be used for the present species and that *C. pestae* is the oldest available name for it.

## Family CHIROSTYLIDAE

*Uroptychus ensirostris* Parisi, 1917PARISI, 1917 - *Atti Soc. Ital. Sc. nat. Milano*, 56: 4, fig. 1.

Holotype: Cat. 46 (ex 1526), male c.l. 14.2 mm (both chelipeds detached).

Locality: Sagami Bay, Japan.

Collected by: A. Owston.

*Remarks:* The specimen has a genital opening on the coxa of the 3rd left pereiopod, but first and second pleopods are masculine on both sides, other pleopods are reduced to small buds.

Probably this is the result of a parasitic castration. In fact what seems to be the remains of a Rhizocephalid is evident on the ventral side of the first abdominal segment.

A redescription of *U. ensirostris* was prepared by one of us (FROGLIA in press).

#### Family PORCELLANIDAE

##### *Orthochela pumila* Glassell, 1936

GLASSELL, 1936 - *Trans. San Diego Soc. nat. Hist.*, 8: 296, pl. 21 fig. 1.

Paratypes: Cat. 14 (ex 2320), 1 male c.l. 3.2 mm, 1 female c.l. 3.4 mm.

Locality: Magdalena Bay, Baja California, Mexico.

Collected by: S. A. Glassell, December 2, 1931.

*Remarks:* In his original description Glassell (1936) designated a holotype and three paratypes, but reported the material examined to be part of a series of 35 specimens. The present material has a hand-written label « *Orthochela pumila* Glassell Magdalena Bay, Baja California 12/2/1931 on sea fans coll. by Steve A. Glassell Paratypes ». PARISI (1938) in the Museum annual Report for the year 1937 mentions the receipt of a collection of decapods from Dr. Steve Glassell, including the paratypes of present species and of other species described by Glassell, i.e.: *Pachycheles sonorensis*, *Petrolisthes sanfelipensis*, *P. tiburonensis*, *P. nigrunguiculatus*, *Pinnixa abbotti* and *Dissodactylus xantusi*.

In the present Museum's collections we could trace all them but *P. nigrunguiculatus*.

##### *Pachycheles sonorensis* Glassell, 1936

(*Pachycheles panamensis* Faxon, 1893)

GLASSELL, 1936 - *Trans. San Diego Soc. nat. Hist.*, 8: 291.

Paratypes: Cat. 16 (ex 2318), 1 male c.l. 6.0 mm, 1 female c.l. 6.9 mm.

Locality: Miramar Bay, near Guaymas, Sonora, Mexico.

Collected by: S. A. Glassell, December 23, 1931.

*Remarks:* According to HAIG (1960) *P. sonorensis* is a junior synonym of *Pachycheles panamensis* Faxon, 1893.

*Petrolisthes sanfelipensis* Glassell, 1936GLASSELL, 1936 - *Trans. San Diego Soc. nat. Hist.*, 8: 281.

Paratypes: Cat. 23 (ex 2314), 1 male, c.l. 8.1 mm (chelipeds detached), 1 female c.l. 7.5 mm.

Locality: San Felipe, Baja California, Mexico.

Collected by: S. A. Glassell, June 8, 1933.

*Petrolisthes tiburonensis* Glassell, 1936GLASSELL, 1936 - *Trans. San Diego Soc. nat. Hist.*, 8: 284.

Paratypes: Cat. 24 (ex 2315), 1 male c.l. 9.2 mm (with right cheliped only), 1 female, c.l. 8.5 mm (only left cheliped, 4th right pereiopod and both 5th pereiopods are attached to the body; several legs are in the bottom of the vial).

Locality: South end of Tiburon Is., Gulf of California.

Collected by: S. A. Glassell, December 31, 1931.

## Family DROMIIDAE

*Cryptodromia asiatica* Parisi, 1915

(Petalomera japonica (Henderson, 1888))

PARISI, 1915 - *Atti Soc. Ital. Sc. nat. Milano*, 54: 105, pl. 2 fig. 3.

Syntypes: Cat. 1078 (ex 1332), 2 males, c.l. 13.7, 17 mm (larger denuded and with legs of left side detached); Cat. 1079 (ex 1332), 3 females, c.l. 11-17 mm (smaller has carapace half-denuded, other two have carapace broken); Cat. 195 (ex 1334), 1 female, c.l. 12 mm; Cat. 196 (ex 1333), 1 female, c.l. 11 mm.

Localities: Tokyo Bay; Lat. 35° 26' N Long. 139° 40' E; Yokohama; Japan.

Collected by: A. Owston.

Remarks: Only specimens from Tokyo (ex Cat. 1332) were labelled « cotipi ». Parisi's statement that the chelipeds are without epipods (« ai chelipedi manca l'epipodite ») is incorrect. Apparently some specimens lost the cheliped's epipod, but its impression is still evident. That makes the species belong not to the genus *Cryptodromia* Stimpson, 1858 and we agree with SAKAI (1976) who considers it a junior synonym of *Petalomera japonica* (Henderson).

*Dromia pseudogibbosa* Parisi, 1915( *Petalomera wilsoni* (Fulton and Grant, 1902))PARISI, 1915 - *Atti Soc. ital. Sc. nat.* Milano, 54: 102, pl. 2 figs 1-2.

Syntypes: Cat. 1280 (ex 1337), 1 male, c.l. 29 mm (carapace denuded); Cat. 4 (ex 1337), 1 male c.l. 30 mm (lacks 4th right pereiopod), 1 female ovigerous, c.l. 17 mm (has only chelipeds and 4th right pereiopod).

Locality: Misaki, Japan.

Collected by: A. Owston, November 14, 1905.

Remarks: Male, cat. 1280, is shown in PARISI (1915) pl. 2 fig. 1 and male, cat. 4, is figured in PARISI (1915) pl. 2 fig. 2.

According to SAKAI (1976) *Dromia pseudogibbosa* is a junior synonym of *Petalomera wilsoni* (Fulton and Grant).

## Family HOMOLIDAE

*Parhomola japonica* Parisi, 1915*Paromola japonica* ParisiPARISI, 1915 - *Atti Soc. ital. Sc. nat.* Milano, 54: 109, pl. 3.

Holotype: Cat. 1083 (ex 1335), female ovigerous, c.l. 112 mm (abdomen and part of mouth apparatus detached).

Locality: Diso, Sagami Bay, Japan.

Collected by: A. Owston, March 12, 1906.

## Family RANINIDAE

*Lyreidus politus* Parisi, 1914( *Lyreidus stenopus* Wood Mason, 1887)PARISI, 1914 - *Atti Soc. ital. Sc. nat.* Milano, 53: 311, pl. 13 fig. 5.

Holotype: Cat. 1082 (ex 1286), male, c.l. 31.7 mm (left cheliped detached).

Locality: Enoshima, Japan.

Collected by: A. Owston, March 15, 1905.

Remarks: *L. politus* is a junior synonym of *L. stenopus* Wood Mason (GRIFFIN, 1970).

## Family DORIPPIDAE

*Ethusa (Ethusina) latidactyla* Parisi, 1914[ *Ethusa latidactyla* (Parisi)]PARISI, 1914 - *Atti Soc. ital. Sc. nat.* Milano, 53 (2): 305, pl. 13 fig. 1.

Holotype: Cat. 5 (ex 1291), female, c.l. 13.5 mm.

Locality: Sagami Bay, Japan.

Collected by: A. Owston, 1913.

*Remarks*: Present species does not belong to the genus *Ethusina* Smith, 1884, characterized by the eyestalk immovably embedded in the orbits, whereas in the present species «... il peduncolo oculare è mobilissimo, allungato, sottile ed ingrossato alla base; sorpassa con tutto l'occhio la lunghezza dei denti extraorbitali» (PARISI, 1914 pag. 305).

#### Family LEUCOSIIDAE

*Philyra peithaihoensis* Shen, 1932

(*Philyra heterograna* Ortmann 1892)

SHEN, 1932 - *Zoologia sinica*, Ser. A, 9 (1): 18, textfigs 10-12, pl. 1 figs 1-2.

Paratypes: Cat. 25 (ex 2193), male c.l. 8.6 mm (lacks one cheliped and all but one walking legs), female, c.l. 11 mm (lacks all pereiopods).

Locality: Peichili Bay, China.

*Remarks*: Present material was received from Dr. Shen (PARISI, 1933). According to SAKAI (1976) *P. peithaihoensis* is a junior synonym of

*P. heterograna* Ortmann.

*Philyra yangmataoensis* Shen, 1932

(*Philyra carinata* Bell, 1855)

SHEN, 1932 - *Zoologia sinica*, Ser. A, 9 (1): 27, textfig. 15, pl. 1 fig. 3.

Paratype: Cat. 26 (ex 2190), male, c.l. 14 mm.

Locality: Shantung peninsula, China.

*Remarks*: Present material was received from Dr. Shen (PARISI, 1933). Subsequently SHEN (1937, pag. 285) synonymized present species with *P. carinata* Bell.

#### Family MAJIDAE

*Pugettia sagamiensis* Gordon, 1931

GORDON, 1931 - *J. Linn. Soc. London, Zool.*, 37, n. 254: 557, figs 35, 36 c.

Holotype: Cat. 39 (ex 1446), male, c.l. 34 mm.

Locality: Sagami bay, Japan.

Collected by: A. Owston, 1913.

*Remarks*: The specimen was originally ascribed by PARISI (1916) to *Pugettia brevirostris* (Doflein, 1904) but was subsequently recognized as a different new species by GORDON (1931).

#### Family HYMENOSOMATIDAE

*Halicarcinus orientalis* T. Sakai, 1932

SAKAI, 1932 - *Sc. Rep. Tokyo Bunrika Daigaku*, Sect. B, 1 (4): 42, fig. 1, pl. 2 fig. 1.

Syntypes: Cat. 7 (ex 2272), male c.l. 4.5 mm (lacks pereiopods 1st to 4st on right side), female c.l. 4.5 mm (ovigerous).

Locality: Tateyama Bay, Japan.

*Remarks*: Sakai described the species on material collected at several localities: Momotori (Ise Bay), Misaki, Tateyama Bay. He did not select a holotype. Present material is part of the type series and was sent to the Museum together with the syntypes of *Caphyra yookadai* and *Parapinnixa asiatica* by Prof. T. Sakai in 1934 (see PARISI, 1935).

#### Family PARTHENOPIDAE

*Lambrus laciniatus enoshimanus* Parisi, 1916

(*Parthenope (Platylambrus) validus laciniatus* (De Haan, 1839))

PARISI, 1916 - *Atti Soc. Ital. Sc. nat.*, Milano, 54: 295, pl. 7 fig. 3.

Holotype: Cat. 1081 (ex 1413), female, c.l. 27.4 mm (lacks 2nd and 4th pereiopods on right side and the left cheliped is detached).

Locality: Enoshima, Japan.

Collected by: A. Owston, March 27, 1907.

*Remarks*: According to SAKAI (1976) *P. validus* is an extremely variable species and present material falls within its « forma » *laciniatus*.

#### Family PORTUNIDAE

*Caphyra yookadai* T. Sakai, 1933

SAKAI, 1933 - *Sc. Rep. Tokyo Bunrika Daigaku*, Sect B, 1 (12): 141, fig. 2, pl. 13 fig. 3.

Syntype: Cat. 2 (ex 2270), female, c.l. 4.8 mm.

Locality: Susaki, near Simoda, Japan.

*Remarks:* The specimen has to be the female mentioned by SAKAI (pag. 143) in his remarks on the species: « The antero-lateral teeth of the carapace are not constant in shape and number; . . . another female has the second of very small size. ».

The specimen was received from Prof. T. Sakai in 1934 (see PARISI 1935).

### *Charybdis sagamiensis* Parisi, 1916

PARISI, 1916 - *Atti Soc. Ital. Sc. nat. Milano*, 55: 175, pl. 11 fig. 1.

Holotype: Cat. 3 (ex 1463), female, c.l. 40 mm (lacks right 4th pereiopod).

Locality: Sagami Bay, Japan.

Collected by: A. Owston.

*Remarks:* *C. sagamiensis* is very close to *C. riversandersoni* Alcock, 1899 and SAKAI (1976) considers it as a synonym of the latter species, whereas STEPHENSON and REES (1968) claim it merits independent status.

### *Portunus parvulus* Parisi, 1915

(*Liocarcinus maculatus* (Risso, 1827))

PARISI, 1915 - *Monitore zool. ital.*, 26: 260.

Syntypes: Cat. 28 (ex 8889), 6 males c.l. 7.7-11.0 mm, 2 females c.l. 10.6, 11.0 mm.

Locality: Gulf of Naples, Italy, depth 30-45 m.

*Remarks:* FROGLIA and MANNING (1982) consider *P. parvulus* a junior synonym of *Liocarcinus maculatus* (Risso), but different from the Atlantic species *Liocarcinus pusillus* (Leach, 1815).

## Family XANTHIDAE

### *Lophoxanthus erosus* Parisi, 1916

(*Medaeops granulosus* (Haswell, 1882))

PARISI, 1916 - *Atti Soc. Ital. Sc. nat. Milano*, 55: 181, fig. 4.

Syntypes: Cat. 9 (ex 1464), 3 males, c.l. 10.0-15.5 mm (largest has all legs detached, smallest has chelipeds detached).

Locality: Tokyo Bay, Japan.

Collected by: A. Owston, November 1900.

*Remarks:* GUINOT (1967) synonymized *L. erosus* Parisi with *Medaeops granulosus* (Haswell, 1882). The cristate merus of the walking legs and the shape of antennal peduncle fully support her opinion.

A ventral view of the frontal region, a pereiopod and the first pleopod of the largest syntype are herein reproduced in Fig. 5.

A figure of the position and shape of gonopods can be found also in MENZIES (1948, pl. 4 fig. 33) based on a sketch made by Parisi from the same specimen.

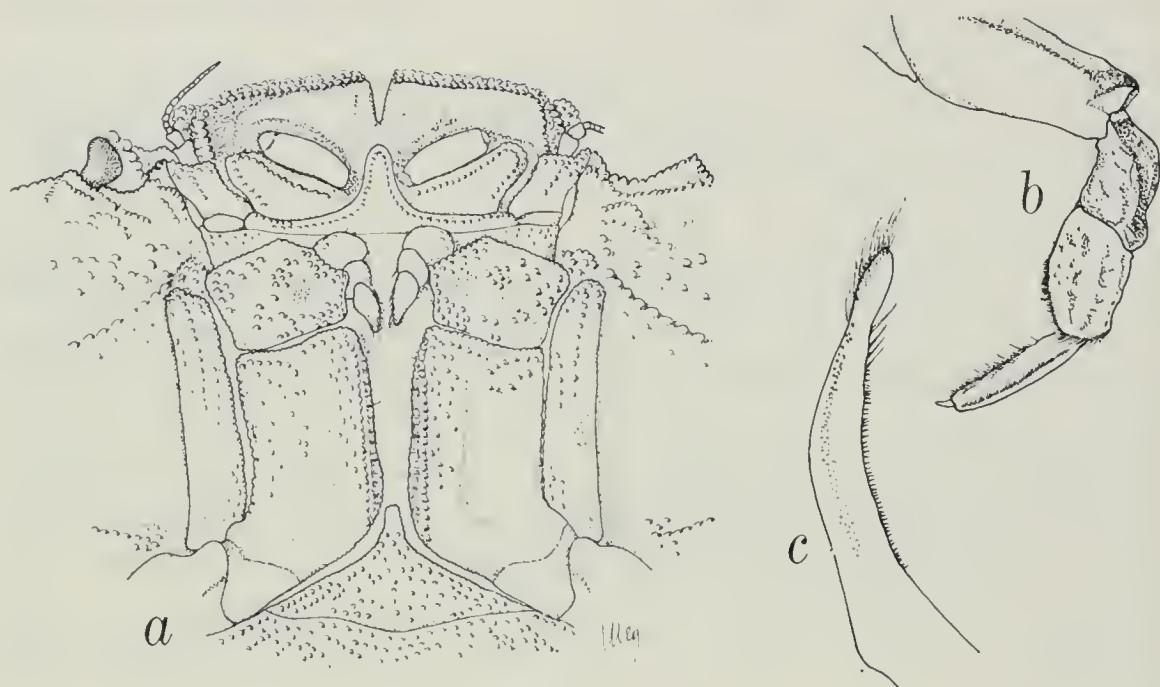


Fig. 5. — *Lophoxanthus erosus* Parisi, 1916 male c.l. 15.5 mm (syntype): a) frontal region in ventral view; b) pereiopod; c) first pleopod.

#### Family GRAPSIDAE

*Sesarma (Chiromantes) alberti* Rathbun, 1921

RATHBUN, 1921 - *Bull. Amer. Mus. nat. Hist.*, 43 (89): 448, pl. 42 fig. 1, pl. 48 fig. 3.

Paratypes: Cat. 1089 (ex 1967), 3 males c.l. 15.8-28.2 mm, 1 female c.l. 25.1 mm.

Locality: Malela, Congo.

Collected by: Lang-Chapin, Congo expedition American Museum of Natural History, July 8, 1915.

*Utica sinensis* Parisi, 1918

(*Eriocheir leptognathus* Rathbun, 1914)

PARISI, 1918 - *Atti Soc. Ital. Sc. nat. Milano*, 57: 102, textfig. 3, pl. 8 fig. 1.

Holotype: Cat. 47 (ex 1655), male, c.l. 17.1 mm (left cheliped and 5th pereiopod detached).

Locality: China.

Collected by: C. Bellotti, 1906.

Remarks: According to SAKAI (1976) *U. sinensis* is a synonym of *Eriocher leptognathus* Rathbun.

### *Helice tridens latimera* Parisi, 1918

PARISI, 1918 - *Atti Soc. Ital. Sc. nat. Milano*, 57: 106, textfig. 4 a-c-d, (not textfig 4 b) pl. 8 fig. 3.

Holotype: Cat. 8 (ex 1651), female, c.l. 25.5 mm (lacks left 4th pereiopod and 3rd is detached, some dactyli of walking legs are broken).

Locality: China.

Collected by: C. Bellotti, 1906.

Remarks: PARISI (1918) mentioned as « Typus » the specimen herein reported as holotype, but his species description and figures are also based on four other specimens -Cat. 334 (ex 1652) and Cat. 335 (ex 1653) from Taiwan (Formosa). These last specimens belong to a closely related but different species.

At request of T. Sakai, Parisi sketched some details of the male (Cat. 335) from Taiwan, considered to be the same species as the « Typus » (see SAKAI T., 1939, pag. 693, textfig. 122 a, b).

On these drawings SAKAI T. (1939, 1977) synonymized with *H. tridens latimera* the subspecies *H. tridens formosensis* described by RATHBUN in 1931.

Recently SAKAI K. and YATSUZUKA (1980) reexamined the holotype of *H. tridens latimera* and the types of the other subspecies of *H. tridens* erected by RATHBUN (1931). They rose to species level the above mentioned subspecies, recognized *H. formosana* to be distinct from *H. latimera* and suggested *H. pingi* Rathbun, 1931 is a junior synonym of *H. latimera* Parisi.

### Family PINNOTHERIDAE

#### *Dissodactylus xantusi* Glassell, 1936

GLASSELL, 1936 - *Trans. San Diego Soc. nat. Hist.*, 8 (21): 299, pl. 21 fig. 4.

Paratypes: Cat. 1080 (ex 2324), 2 males c.l. 3.8-3.9 mm (the larger with carapace broken and without some pereiopods), 2 females, c.l. 4.3-4.5 mm.

Locality: Espiritu Santo Island, Gulf of California, Mexico.

*Parapinnixa asiatica* T. Sakai, 1933

[*Sakaina asiatica* (T. Sakai)]

SAKAI T., 1933 - *Sci. Rept. Tokyo Bunrika Daigaku*, Sect. B, 1 (12): 143, figs 3 a-c, pl. 13 fig. 2.

Syntypes: Cat. 21 (ex 2269), male c.l. 1.7 mm, female c.l. 1.5 mm.

Locality: Akane, near Shimoda, Japan.

*Pinnixa abbotti* Glassell, 1935

GLASSELL, 1935 - *Trans. San Diego Soc. nat. Hist.*, 8 (5): 13.

Paratypes: Cat. 27 (ex 2327), male c.l. 2 mm, female c.l. 3 mm.

Locality: San Felipe, Lower California.

#### Family ISOLAPOTAMIDAE

*Potamon (Potamon) formosanum* Parisi, 1916

[*Nanhaipotamon formosanum* (Parisi, 1916)]

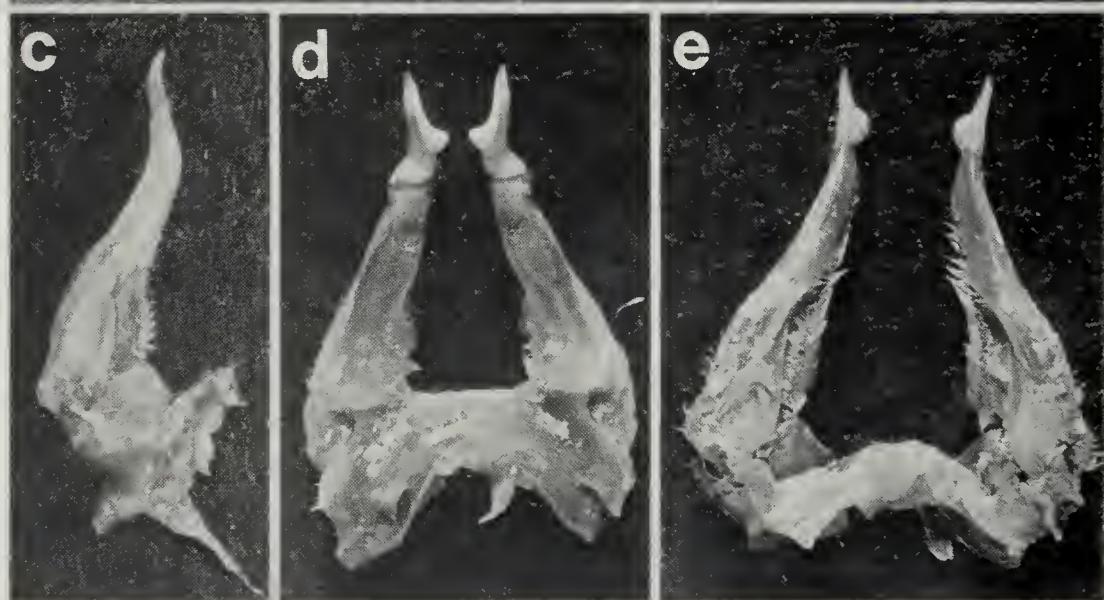
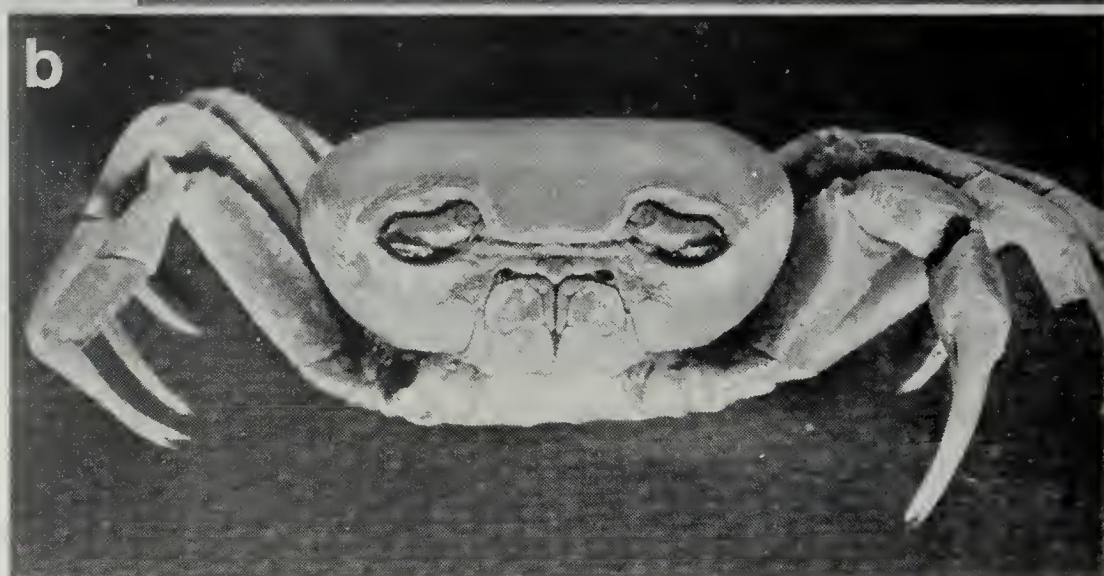
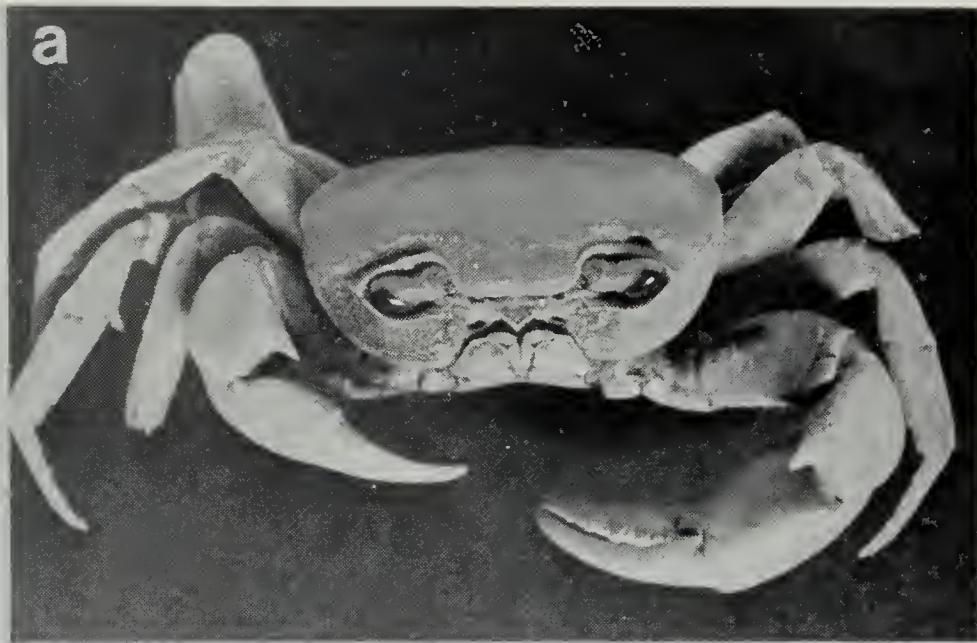
PARISI, 1916 - *Atti Soc. ital. Sc. nat. Milano*, 55: 156, textfig. 2a, pl. 8 fig. 1, pl. 9 fig. 1.

Syntypes: Cat. 32 (ex 1468), 2 males c.l. 25.5-29.5 mm (larger has abdomen, gonopods, chelipeds and 5th right pereiopod detached, smaller has left cheliped detached), 1 female c.l. 28.7 mm; Cat. 31 (?ex Duplicati), female c.l. 27.2 mm (both chelipeds detached, some pereiopods broken); Cat. 868 (ex 1469), male c.l. 24 mm.

Locality: Janvar, Formosa.

Collected by: A. Owston, 12 May 1909 (Cat. 32), 26 August 1907 (Cat. 868).

Pl. 1. — a) *Potamon formosanum* Parisi, 1916 male c.l. 29.5 mm (syntype), frontal view; b) *Potamon globosum* Parisi, 1916 male c.l. 29 mm (syntype), frontal view; c) *Potamon Whiteheadi* Parisi, 1916, male c.l. 28.5 mm (syntype), first pleopod; d) *P. formosanum* male c.l. 29.5 mm (syntype), first pleopod; e) *P. globosum* male c.l. 28.5 mm (syntype), first pleopod.



*Remarks:* This species is characterized by having the first gonopod distally expanded and flattened (Pl. 6 Fig. d) and is the type species of the genus *Nanhaiptamon* Bott, 1968.

In the diagnosis of present species given by BOTT (1970, pag. 195) there is a wrong statement «... Scherenfinger schlank, lang und gebogen.», see Pl. 7 Fig. a and our Remarks under *Potamon globosum*.

#### Family POTAMIDAE

*Geotelphusa annamensis* Balss, 1914.

[*Tiwariptamon annamense* (Balss)]

BALSS, 1914 - *Zool. Jb. (Syst)*, 37: 406, figs D-F, pl. 15 fig. 1.

Paralectotype: Cat. 6 (ex 2101), male c.l. 29.5 mm.

Locality: Phuc Son, Annam.

Collected by: Fruhstorfer.

*Remarks:* The specimen was obtained in exchange from the Munich Museum (PARISI, 1929); BOTT (1970) selected a Lectotype among the other syntypes deposited in the collection of Munich Museum.

*Geotelphusa annamensis* Balss is the type species of the genus *Tiwariptamon* Bott, 1970. See also the remarks under *Potamon Whiteheadi*.

*Potamon edule hippocratis* Ghigi, 1929

[*Potamon potamios hippocratis* Ghigi]

GHIGI, 1929 - *Archivio zoologico ital.*, 13 (1-2): 245.

Syntypes: Cat. 35 (ex 2118), male c.l. 41.7 mm, female c.l. 35.6 mm (specimen are ink marked on the carapace « Coo 4 » the male and « Coo 7 » the female).

Locality: Streams west of Coo city, Coo Is., Aegean Sea.

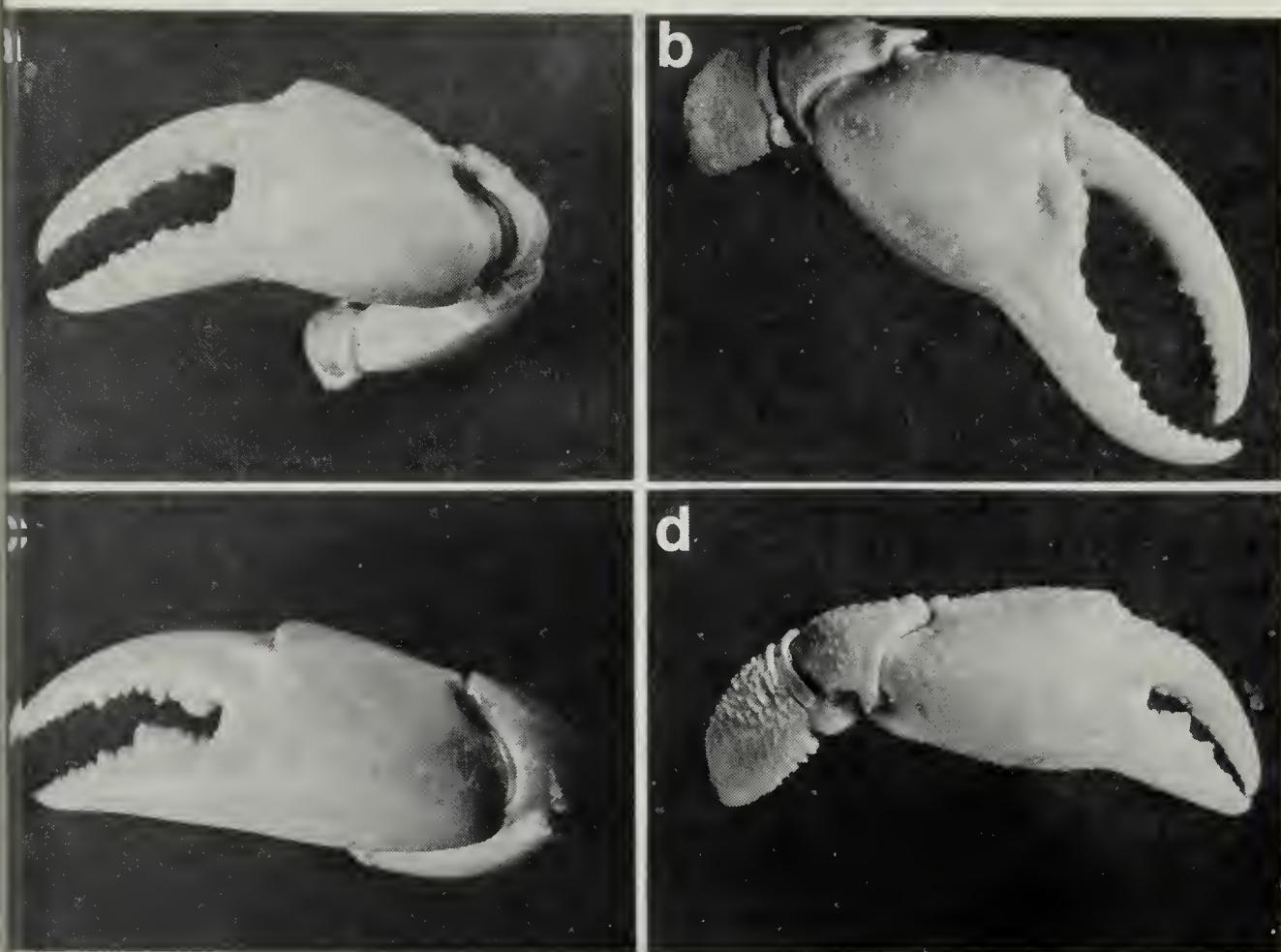
Collected by: A. Ghigi, 1926.

*Remarks:* Prof. Ghigi donated the present specimens to the Museum in 1929 (PARISI, 1930). The present subspecies, according to BOTT (1970), falls within the variability of the nominal species *Potamon potamios potamios* (Oliver), whereas PRETZMANN (1983) maintains its validity and splits it into several « natiros ».

*Potamon edulis* var. *rhodia* Parisi, 1913

[*Potamon potamios rhodium* Parisi]

PARISI, 1913 - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 28 (677): 1.



Pl. 2. — Chelipeds: a) *Potamon formosanum* Parisi, 1916 (syntype), female c.l. 27.2 mm; b) *Potamon globosum* Parisi, 1916 (syntype), male c.l. 28.5 mm; c) *Potamon hainanense* Parisi, 1916 (holotype), female c.l. 38 mm; d) *Potamon Whiteheadi* Parisi, 1916 (syntype), male c.l. 25.6 mm.

Paralectotypes: Cat. 30 (ex 1184), 3 males c.l. 29.2 to 50.6 mm, 3 females c.l. 15.8 to 42.7 mm.

Locality: Kattabia, Rhodes Is., Aegean Sea.

Collected by: E. Festa, 1911.

*Remarks:* The other specimens of the type-series studied by Parisi are in the collections of the Zoological Museum in Torino; from them PRETZMANN (1967) selected the larger male (c.l. 53 mm) as Lectotype of *P. potamios rhodium*.

BOTT (1970) considered that the present subspecies, and all the others created for the Aegean Islands, falls within the variability of *P. potamios potamios*.

*Potamon (Geothelphusa) globosum* Parisi, 1916

PARISI, 1916 - *Atti Soc. ital. Sc. nat. Milano*, 55: 164, text fig. 3, pl. 10 figs 1 and 2.

Syntypes: Cat. 33 (ex 1465), 4 males c.l. 24 to 34 mm (some have the main cheliped detached and tilted to the body), 3 females c.l. 22 to 27 mm. Cat. 1084, 1 male c.l. 22 mm.

Locality: Okinawa, Loochoo Is.

Collected by: A. Owston, May 7, 1914.

*Remarks:* The Zoologische Staatssammlung in Munich received from the Milano Museum a male specimen of the types series of *P. globosum*, BALSS (1937, pag. 167, fig. 31) reported this specimen and illustrated its first pleopod, but the specimen reported by BOTT (1970, pag. 196, pl. 41 fig. 84, pl. 57 fig. 84) as the « Paratypoid » of *Nanhaiopotamon formosanum globosum* (Parisi), deposited in the Munich Museum, does not belong to the present species. Perhaps a mislabeling occurred in handling the material after 1937. In fact the drawing of first pleopod given by BALSS (1937, fig. 31) is close to the photograph obtained from one of the males in the Milano collection (Pl. 6 Fig. e) and quite different from that can be found in BOTT (1970, pl. 41 fig. 84).

Adult males of the present species can be immediately recognized also by the shape of the chelipeds (see PARISI, 1916b, pag. 166 fig. 3); BOTT statement (1970, pag. 196) « Scherenfinger kurz und dick, deutlich bezahnt, nicht klaffend » does not apply to males of present species with carapace length above 27 mm (Pl. 7 fig. b).

We consider *Potamon (Geothelphusa) globosum* Parisi to be a good species; for the characteristics of first gonopod (Pl. 6 Fig. e) it could be included in the genus *Ranguna* Bott 1966. Anyway it is not related to *Nanhaiopotamon formosanum* (Parisi).

*Potamon hainanense* Parisi, 1916

PARISI, 1916 - *Atti Soc. ital. Sc. nat. Milano*, 55: 167, pl. 7 fig. 2, pl. 9 fig. 3.

Holotype: Cat. 34 (ex 1466), female c.l. 38 mm (left cheliped, both third pereiopods and 5th right pereiopod detached).

Locality: Hainan.

Collected by: A. Owston.

*Remarks:* BOTT (1970), from the first gonopod of a male from Hainan in the collections of the Berlin Museum figured in BALSS (1937), sup-

posed the identity of present species with *P. formosanum* Parisi. But male first pleopod of *P. formosanum* (see Pl. 6 Fig. d present paper) is quite different from that figured by BALSS (1937 fig. 29) as the first gonopod of *P. hainanense*. See also our Remarks under *P. globosum*.

At present we cannot say if the specimen examined by BALSS (1937) is the male of *P. hainanense*, but comparison of the holotype of *P. hainanense* with females in the types series of *P. formosanum* and *P. globosum* proved it is different from both.

It is different also from the other Potamid crabs (*Tiwaripotamon whiteheadi*, *Ranguna orientalis* and *Sommaniathelphusa sinensis* (H. Milne Edwards) known from Hainan (BALSS, 1937, pag. 174).

*Potamon (Potamon) orientale* Parisi, 1916

[*Ranguna orientalis* (Parisi)]

PARISI, 1916 - *Atti Soc. Ital. Sc. nat. Milano*, 55: 159, fig. 2b, pl. 8 fig. 2, pl. 9 fig. 2.

Syntypes: Cat. 38 (ex 1470), 4 males c.l. 19.1 to 33.5 mm (one with abdomen detached); 2 females c.l. 12.7-24 mm (smaller has carapace crashed and lacks walking legs); Cat. 1086 (ex 1470), 1 male c.l. 20 mm, 2 females c.l. 17-20.5 mm (all specimens are incomplete).

Locality: Wuchi Mount, Hainan.

Collected by: A. Owston, April 20, 1904.

Remarks: According to BOTT (1970) this species belongs to the genus *Ranguna* Bott 1966.

*Potamon (Potamon) Whiteheadi* Parisi, 1916

[*Tiwaripotamon whiteheadi* (Parisi)]

PARISI, 1916 - *Atti Soc. Ital. Sc. nat. Milano*, 55 (2-3): 153, text fig. 1c, pl. 7 fig. 1, pl. 9 fig. 4.

Syntypes: Cat. 1087 (ex 1467), 2 males c.l. 25.6-28.5 mm (larger has abdomen detached and lacks left 4th pereiopod, smaller has maxillipeds, chelipeds and pereiopods on left side detached).

Locality: Hainan, China.

Collected by: A. Owston.

Remarks: Parisi's statement « il carapace è circa un terzo più lungo che largo » is a misprinting as clearly results from measurements given for three males and from the figure (PARISI, 1916b, pag. 156 and pl. 7 fig. 1).

BOTT (1970) supposed the identity of *P. Whiteheadi* Parisi with *Geothelphusa annamensis* Balss, 1914 and *Potamon araneus* Rathbun 1904.

The Milano collection includes also a paratype of *G. annamensis*, comparison of these materials showed several differences between the two species: front much wider in *P. whiteheadi*, ca. 0.28 max. carapace width, compared to *G. annamensis*, ca. 0.20 max width of carapace; anterolateral border only slightly indented in *G. annamensis* and with a well developed epibranchial spine in *P. whiteheadi*. Also the walking legs are shorter in *P. whiteheadi* (ratio: length merus Pr3/max. carapace width = 0.63-0.65) compared to *G. annamensis* (ratio = 0.74).

*P. araneus* is based on a single young male and from the original description (RATHBUN, 1904, pag. 214) seems to be characterized by still longer legs.

The present species is included in the genus *Tiwaripotamon* Bott 1970.

#### Family PSEUDOTHELPHUSIDAE

##### *Pseudothelphusa Jouyi* Rathbun, 1893

RATHBUN, 1893 - *Proc. U.S. nat. Mus.*, 16: 649, pl. 73, pl. 74 figs 1-3.

Syntype: Cat. 906 (ex 2058), female ovigerous c.l. 22.5 mm.

Locality: Juanacatlan falls, Rio San Juan, Mexico.

Collected by: P. L. Jouy, April 26, 1892.

Remarks: received in exchange from the U.S. National Museum (USNM catalogue number 17720) in 1926.

PRETMANN (1972) considers it a subspecies of *P. americana* whereas RODRIGUEZ (1982) claims its independent status.

#### Family SINOPOTAMIDAE

##### *Potamon lansi* Doflein, 1902

[*Sinopotamon lansi* (Doflein)]

DOFLEIN, 1902 - *Abh. bayer. Akad. Wiss.*, (2), 21 (3): 626, pl. 6 figs 1-3.

Paralectotype: Cat. 37 (ex 2103), male c.l. 20.7 mm.

Locality: Hanfluss, Jangtsekiang, China.

Collected by: Haberer, 1900.

Remarks: BOTT (1970) selected as Lectotype a male (c.l. 33 mm) in the types series of *P. lansi* in the Munich Staatsanmmlungen.

Present material was received in exchange from Munich Museum in 1928 (see: PARISI, 1929).

## Family SUNDATHELPHUSIDAE

*Potamon Montanoanus* Rathbun, 1904

(*Sundathelphusa philippina* (Von Martens, 1868))

RATHBUN, 1904 - *Nouv. Arch. Mus. Hist. nat. Paris*, 4e ser., 6: 309, textfig. 36, pl. 13 fig. 7.

Syntype: Cat. 1085 (ex 1922), male c.l. 14.5 mm (lacks left cheliped and some walking legs are incomplete).

Locality: Mindanao, Philippines.

Collected by: M. Montano.

Remarks: BOTT (1970) identifies the present species with *Sundathelphusa philippina* (Von Martens).

## Family POTAMONAUTIDAE

*Potamon (Potamonautes) calcaratum* Gordon, 1929

[*Potamonautes calcaratus* (Gordon)]

GORDON, 1929 - *Ann. Mag. nat. Hist.*, 10 (3): 405, figs 1-5.

Paratypes: Cat. 29 (ex 2213), male c.l. 18.8 mm, female c.l. 19 mm.

Locality: Charre, lower Zambesi, Mozambique.

Remarks: From carapace measurements we believe the present specimens are the male n. 4 and the female n. 2 quoted by GORDON (1929, pag. 410, Tab. 1); they were obtained in exchange from the British Museum, London (PARISI, 1934).

*Potamon Ignestii* Parisi, 1923

[*Potamonautes ignestii* (Parisi)]

PARISI, 1923 - *Atti Soc. Ital. Sc. nat. Milano*, 61: 332, textfig. 1, pl. 8 figs 1, 2.

Syntypes: Cat. 36 (ex 2008), 1 male c.l. 28.3 mm (left cheliped detached), 3 females c.l. 23.4 to 30.1 mm.

Locality: Gondar, small streams tributary of Lake Tana, Ethiopia.

Collected by: U. Ignesti, 1921.

Remarks: BOTT (1955) considers *P. ignestii* a subspecies of *P. berardi* (Audouin).

## Family TRICHODACTYLIDAE

*Trichodactylus borellianus* Nobili, 1896

NOBILI, 1896 - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 11 (222): 2.

Syntype: Cat. 42 (ex 1833), female, c.l. 11 mm.

Locality: Colonia Risso, Rio Apa, Paraguay.

Collected by: A. Borelli, 1893-1894.

*Trichodactylus (Valdivia) boliviensis* Parisi, 1923

(*Zilchiopsis cryptodus* (Ortmann, 1893))

PARISI, 1923 - *Annali Museo civ. St. nat. Genova*, 51: 29, 1 fig.

Paratype: Cat. 41 (ex 2013), male, c.l. 23.5 mm.

Locality: Misiones Mosetenés, Bolivia.

Collected by: L. Balzan, 1892.

*Remarks:* BOTT (1969) synonymizes the present species with *Zilchiopsis cryptodus* (Ortmann).

## Family OCYPODIDAE

*Uca festae* Nobili, 1901

NOBILI, 1901 - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 16 (415): 51.

Paratypes: Cat. 44 (ex 2287), 1 male c.l. 10.4 mm, 3 females c.l. 9.3 to 10.9 mm.

Locality: Rio Daule inferiore, Ecuador.

Collected by: E. Festa, 1900.

*Remarks:* Present material was received in exchange from the Museum of the Zoological Institute, University of Torino (PARISI, 1935) where still are deposited the other specimens of the type series, the larger male among them is the holotype according to CRANE (1975).

*Uca uruguayensis* Nobili, 1901

NOBILI, 1901 - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 16 (402): 14.

Paratype: Cat. 45 (ex 2286), male, c.l. 10 mm.

Locality: La Sierra, Uruguay.

Collected by: F. Silvestri, 1900.

*Remarks:* In the original description of *U. uruguayensis* Nobili (1901) reported 3 males and 1 female from La Sierra, but gave measurements of 4 males and 1 female.

Measurements obtained for the main cheliped (overall length 20.5 mm, palm length 8.5 mm) of the present specimen agree with those listed in the original account for one of the males.

The present specimen was received in exchange from the Museum of Zoology of Torino University (PARISI, 1935).

Nobili did not select a holotype, but according to CRANE (1975) in the collection of the Museum of Zoology, University of Torino, the largest male has label follows name with « *Typo Dr. F. Silvestri 1900* ».

### *Scopimera bitympana* Shen, 1930

SHEN, 1930 - *Bull. Fan Mem. Inst. Biol. Peiping*, 1 (14): 227, figs 1-2.

Paratypes: Cat. 40 (ex 2153), male c.l. 7.5 mm, female c.l. 7.5 mm.

Locality: Peitaiho, Peichili bay, China.

Collected by: C. J. Shen, June 20, 1930.

*Remarks:* These specimens were sent to the Museum by Dr. Shen in 1931 (PARISI, 1932). In the jar there is still a label from « Fan Memorial Institute » with the note « *cotypi cat. 7473* ».

The specimens have to belong to the series of 216 specimens, collected at Peitaiho in June 18-20, 1930 and mentioned by SHEN (1930, pag. 231) in the list of « material examined ».

### *Scopimera longidactyla* Shen, 1932

SHEN, 1932 - *Zoologia sinica*, Ser. A, 9 (1): 259, figs 158-160, pl. 10 fig. 6.

?Paratype: Cat. 1088 (ex 2189), male, c.l. 8.1 mm.

Locality: Shantung peninsula, Peichili Bay, China.

*Remarks:* The present specimen was sent to the Museum by Dr. Shen in 1932 and mentioned as cotype by PARISI (1933). The type locality reported by Shen is Shanhakuan, Peichili Bay; the present material come from Shantung peninsula, Peichili Bay, but an inside-label pencil-written has the same number, 7412, of the type series mentioned by Shen.

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Dr. R. B. Manning (Smithsonian Institution, Washington) revised the manuscript and like always made valuable suggestions; Dr. Chen Huiljan (Academia Sinica Peking) and Dr. J. Haig (Allan Hancock Foundation, Los Angeles) made available to us some literature we could not trace in Italy; Dr. M. E. Gramitto (IRPEM, Ancona) drew all the figures and Mr. L. Spezia (Museo civico Storia naturale, Milano) made the photographs of the potamid crabs. To them all our best thanks.

## LITERATURE CITED

- AL-ADHUB A. H. Y. & WILLIAMSON D. I., 1975 - Some European Processidae (Crustacea, Decapoda, Caridea) - *J. nat. Hist.*, 9, pp. 693-703, figs 1-4.
- BALSS H., 1914 - Potamonidenstudien - *Zool. Jb. (Syst.)*, Jena, 37, pp. 401-410, figs A-F, pl. 15.
- BALSS H., 1937 - Potamoniden (Dekapoda Brachyura) der Philippinen und des Malayischen Archipels - *Int. Rev. Hydrobiol.*, Leipzig, 34, pp. 143-187, figs 1-36.
- BOTT R., 1969 - Die Süßwasserkrabben Sud-Amerikas und ihre Stammesgeschichte. Eine Revision der Trichodactylidae und Pseudothelphusidae ostlich der Anden (Crustacea Decapoda) - *Abh. senckenb. naturf. Ges.*, Frankfurt a. M., 518, pp. 1-94, figs 1-6, pls 1-24, 4 maps.
- BOTT R., 1970 - Die Süßwasserkrabben von Europa, Asien, Australien und ihre Stammesgeschichte. - *Abh. senckenb. naturf. Ges.*, Frankfurt a. M., 526, pp. 1-338, figs 1-8, pls 1-58.
- BOWMAN T. E. & ABELE L. G., 1982 - Classification of the Recent Crustacea - The Biology of Crustacea *D. E. Bliss Ed.*, 1, pp. 1-27.
- CRANE J., 1975 - *Fiddler Crabs of the World. Ocypodidae: Genus Uca* - Princeton University Press, Princeton, New Jersey, pp. xxiv + 737, figs 1-101, pls 1-50.
- DOFLEIN F., 1902 - Ostasiatische Dekapoden - *Abh. k. bayer. Akad. Wiss.*, Cl. II, 21 (3), pp. 613-670, pls 1-6.
- FROGLIA C., (in press) - Redescription of *Uroptychus ensirostris* Parisi, 1917 (Decapoda, Anomura, Chirostylidae) - *Crustaceana*.
- FROGLIA C. & MANNING R. B., 1982 - Notes on *Liocarcinus pusillus* (Leach) and related species - *Quad. Lab. Tecnologia Pesca*, Ancona, 3 (2-5), pp. 257-266, figs. 1-3.
- GHIGI A., 1929 - Ricerche faunistiche nelle isole italiane dell'Egeo. Potamonidi - *Archo zool. ital.*, 13 (1-2), pp. 243-248.
- GLASSELL S. A., 1935 - Three new species of *Pinnixa* from the gulf of California - *Trans. San Diego Soc. nat. Hist.*, 8 (5), pp. 13-14.
- GLASSELL S. A., 1936 - New porcellanids and pinnotherids from tropical north American waters - *Trans. San Diego Soc. nat. Hist.*, 8 (21), pp. 277-304, pl. 21.
- GORDON I., 1929 - A new River-crab of the subgenus *Potamonautes* from Portuguese East Africa - *Ann. Mag. nat. Hist.*, 10 (3), pp. 405-411, figs 1-5.
- GORDON I., 1931 - Brachyura from the coasts of China - *J. Linn. Soc. London, Zool.*, 37 (254), pp. 525-558, figs 1-36.
- GRIFFIN D. J. G., 1970 - A revision of the recent Indo-West Pacific species of the genus *Lyreidus* De Haan - *Trans. R. Soc. N. Z., Biol. Sci.*, 12 (10), pp. 89-112.
- GUINOT D., 1967 - Recherches préliminaires sur les groupements naturels chez les crustacés Décapodes Brachyoures. II. Les anciens genres *Micropanope* Stimpson et *Medaeus* Dana - *Bull. Mus. Hist. nat.*, Paris, 2e sér., 39 (2), pp. 345-374, figs 1-42.
- HAIG J., 1960 - The Porcellanidae (Crustacea anomura) of the eastern Pacific - *Allan Hancock Pacific Expeditions*, 24, pp. 1-440, pls 1-40.
- HOLTHUIS L. B., 1950 - The Decapoda of the Siboga expedition. Part X. The Palaemonidae collected by the Siboga and Snellius expeditions with remarks on other species I. Subfamily Palaemoninae - *Siboga Expeditie*, 39a, 9, pp. 1-268, figs 1-52.

- HOLTHUIS L. B., 1953 - On the supposed validity of the specific names *Callianassa laticauda* Otto and *Callianassa pontiea* Czerniavsky - *Pubbl. Staz. zool. Napoli*, 24 (1), pp. 92-99, figs 1-5.
- JENKINS R. J. F., 1972 - *Metanephrops*, a new genus of late pliocene to recent Lobsters (Decapoda, Nephropidae) - *Crustaceana*, 22 (2), pp. 161-177, 2 pls.
- KENSLEY B., 1974 - Type specimens of Decapoda (Crustacea) in the collections of the South African Museum - *Ann. S. Afr. Mus.*, 66 (4), pp. 55-80.
- DE MAN J. G., 1925 - The Decapoda of the Siboga Expedition. Part. VI. The Axiidae collected by the Siboga-Expedition - *Siboga Expeditie*, 39a, 5, pp. 1-127, pls 1-10.
- DE MAN J. G., 1928 - A contribution to the knowledge of twenty-two species and three varieties of the genus *Callianassa* Leach - *Capita Zoologica*, 2 (6), pp. 1-56, pls 1-12.
- MANNING R. B. & STEVCIC Z., 1982 - Decapod fauna of the Piran gulf - *Quad. Lab. Tecnologia Pesca*, Ancona, 3 (2-5), pp. 285-304.
- MENZIES R. J., 1948 - A revision of the Brachyuran genus *Lophopanopeus* - *Occ. Pap. Allan Hancock Foundation*, 4, pp. 1-45, pls 1-6.
- MOLTONI E., 1957 - Bruno Parisi (1884-1957) - *Atti Soe. it. Se. nat., Milano*, 96, pp. 211-222.
- NOBILI G., 1896 - Viaggio del Dott. A. Borelli nella Repubblica Argentina e nel Paraguay - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 11 (222), pp. 1-4.
- NOBILI G., 1901a - Decapodi raccolti dal Dr. Filippo Silvestri nell'America meridionale - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 16 (402), pp. 1-16, 1 fig.
- NOBILI G., 1901b - Viaggio del Dr. Enrico Festa nella repubblica dell'Ecuador e regioni vicine. Decapodi e Stomatopodi - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 16 (415), pp. 1-58.
- NOUVEL H. & HOLTHUIS L. B., 1957 - Les Processidae (Crustacea Decapoda Natantia) des eaux européennes - *Zool. Verhandelingen*, Leiden, 32, pp. 1-53, figs 1-217.
- PARISI B., 1913 - Escursioni zoologiche del Dott. Enrico Festa nell'Isola di Rodi. Decapodi - *Boll. Musei Zool. Anat. comp. Univ. Torino*, 677, 2 pp.
- PARISI B., 1914 - I Decapodi giapponesi del Museo di Milano I. Oxystomata - *Atti Soe. ital. Sei. nat. Museo eiv. Stor. nat. Milano*, 53 (2), pp. 282-312, figs 1-5, pls 11-13.
- PARISI B., 1915a - I Decapodi giapponesi del Museo di Milano II. Dromiacea - *Atti Soe. ital. Sei. nat. Museo eiv. Stor. nat. Milano*, 54 (1), pp. 102-116, figs 1-2, pls 2-3.
- PARISI B., 1915b - Note su alcuni Crostacei del Mediterraneo - *Monitore zool. ital.*, 26, pp. 62-66.
- PARISI B., 1915c - Il genere *Portunus* nel Mediterraneo e descrizione di una nuova specie - *Monitore zool. ital.*, 26, pp. 256-260.
- PARISI B., 1916a - I Decapodi giapponesi del Museo di Milano III. Oxyrhyncha - *Atti Soc. ital. Sci. nat. Museo eiv. Stor. nat. Milano*, 54 (2-4), pp. 281-296, figs 1-4, pl. 7.
- PARISI B., 1916b - I Decapodi giapponesi del Museo di Milano IV. Cyclometopa - *Atti Soe. ital. Sci. nat. Museo eiv. Stor. nat. Milano*, 55 (2-3), pp. 153-191, figs 1-4, pl. 7-11.
- PARISI B., 1917 - I Decapodi giapponesi del Museo di Milano V. Galatheidea e Reptantia - *Atti Soc. ital. Sei. nat. Museo eiv. Stor. nat. Milano*, 56 (1-2), pp. 1-24, figs 1-7.

- PARISI B., 1918 - I Decapodi giapponesi del Museo di Milano VI. Catometopa e Paguridea - *Atti Soc. ital. Sci. nat. Museo civ. Stor. nat. Milano*, 57 (1-2), pp. 90-115, figs 1-5, pl. 8.
- PARISI B., 1919 - I Decapodi giapponesi del Museo di Milano VII. Natantia - *Atti Soc. ital. Sci. nat. Museo civ. Stor. nat. Milano*, 58 (1), pp. 59-99, figs 1-8, pls 3-6.
- PARISI B., 1921 - Un nuovo crostaceo cavernicolo: *Typhlocaris lethaea* n. sp. - *Atti Soc. ital. Sci. nat. Museo civ. Stor. nat. Milano*, 59 (3-4), pp. 241-248, figs 1-7.
- PARISI B., 1922 - Un nuovo Potamonide dell'Abissinia - *Atti Soc. ital. Sci. nat. Museo civ. Stor. nat. Milano*, 61, pp. 332-339, fig. 1, pl. 8.
- PARISI B., 1923 - Un nuovo Potamonide americano - *Annali Museo civ. Stor. nat. Genova*, 51, pp. 29-30, 1 fig.
- PARISI B., 1929 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1928 - *Atti Soc. ital. Sci. nat. Milano*, 68, pp. 327-334.
- PARISI B., 1930 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1929 - 8 pp.
- PARISI B., 1932 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1931 - *Tip. Fusi*, Pavia, 12 pp.
- PARISI B., 1933 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1932 - Milano, 8 pp.
- PARISI B., 1934 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1933 - *Tip. Fusi*, Pavia, 12 pp.
- PARISI B., 1935 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1934 - *Tip. Fusi*, Pavia, 12 pp.
- PARISI B., 1938 - Incremento delle Collezioni del Museo civico di Storia naturale di Milano nell'anno 1937 - *Tip. Fusi*, Pavia, 12 pp.
- PAULUCCI MACCAGNO T., 1961 - Missione 1957 del Prof. Giuseppe Scortecci in Migiurtinia (Somalia sett.). Crustacea Decapoda Natantia - *Atti Soc. ital. Sci. nat. Museo civ. Stor. nat. Milano*, 100 (3), pp. 335-344, pls 17-18.
- PRETMANN G., 1967 - Die mediterranen und vorderasiatischen Potamoniden der Naturhistorischen Museen in Paris, Turin, Kopenhagen und Washington - *Ann. naturhist. Mus. Wien*, 70, pp. 217-232, 1 fig.
- PRETMANN G., 1972 - Die Pseudothelphusidae (Crustacea Brachyura) - *Zoologica*, Stuttgart, 120, 182 pp., 732 figs.
- PRETMANN G., 1983 - Ergebnisse einiger Sammelreisen nach Vorderasien 7. Die Süsswasserkrabben der Türkei - *Ann. naturhist. Mus. Wien*, 84 B, pp. 281-300, pls 1-12.
- RATHBUN M. J., 1893 - Description of new species of American fresh water crabs - *Proc. U.S. Nat. Mus.*, 16 (959), pp. 649-661, pls 73-77.
- RATHBUN M. J., 1904 - Les Crabes d'eau douce (Potamonidae) - *Nouv. Arch. Mus. Hist. nat.*, Paris, 4e ser., 6, pp. 225-312, figs 1-37, pls 9-18.
- RATHBUN M. J., 1921 - The Brachyuran Crabs collected by the American Museum Congo Expedition, 1909-1915 - *Bull. Amer. Mus. nat. Hist.*, 43, pp. 379-474, figs 1-22, pls 15-64.
- RATHBUN M. J., 1931 - New and rare Chinese crabs - *Lingnan Sci. J.*, 8, pp. 75-104, pls 5-15.
- RODRIGUEZ G., 1982 - Les Crabes d'eau douce d'Amérique - *ORSTOM, Faune Tropicale*, 22, pp. 1-223, figs 1-132.

- SAKAI K. & YATSUZUKA K., 1980 - Notes on some Japanese and Chinese *Helice* with *Helice (Helicana)* n. subgen. including *Helice (Helicana) japonica* n. sp. (Crustacea: Decapoda) - *Senckenbergiana biol.*, 60 (5-6), pp. 393-411, figs 1-19.
- SAKAI T., 1932 - Notes on some rare materials of Japanese Oxyrhyncha - *Sci. Rep. Tokyo Bunrika Daigaku*, sect. B, 1 (4), pp. 41-59, figs 1-8, pls 2-3.
- SAKAI T., 1933 - A new genus and some new species of crabs from Shimoda - *Sci. Rep. Tokyo Bunrika Daigaku*, sect. B, 1 (12), pp. 137-144, figs 1-3, pl. 13.
- SAKAI T., 1939 - Studies on the crabs of Japan, IV. Brachygnatha, Brachyrhyncha - Tokyo, Yokendo, pp. 365-741, pls 42-111.
- SAKAI T., 1976 - Crabs of Japan and the adjacent seas - Tokyo, Kodansha Ltd. [3 Volumes: (1) English text, pp. xxix + 773, figs 1-379; (2) Plates volume, pp. 1-16, pls 1-251; (3) Japanese text, pp. 1-361, figs 1-2].
- DE SAINT LAURENT M. & BOZIC B., 1974 - Diagnose et tableau de détermination des Callianasses de l'Atlantique nord oriental et de Méditerranée (Crustacea, Decapoda, Callianassidae) - *Thalassia Jugosl.*, 8 (1), pp. 15-40, figs 1-35.
- SHEN C., 1930 - A new *Scopimera* from North China - *Bull. Fan Mem. Inst. Biol.*, Peiping, 1 (14), pp. 227-231, 2 figs.
- SHEN C., 1932 - The Brachyuran Crustacea of North China - *Zoologia sinica*, Ser. A, 9 (1), pp. 1-320, figs 1-171, pls 1-10, 1 map.
- SHEN C., 1937 - Second addition to the fauna of Brachyuran Crustacea of North China, with a check list of the species recorded in this particular region - *Contr. Inst. Zool. Nat. Acad. Peiping*, 3 (6), pp. 277-312, figs 1-11.
- STEPHENSON W. & REES M., 1968 - A revision of the *Charybdis miles* « group » of species (Crustacea: Portunidae), with description of a new species from Queensland waters - *Mem. Qd Mus.*, 15 (2), pp. 91-109, figs 1-3, pl. 12.
- VATOVA A., 1943 - I Decapodi della Somalia - *Thalassia*, 6 (2), pp. 1-37, pls 1-4.
- YU S., 1931 - Note sur les crevettes chinoises appartenant au genre *Palaemon* Fabr. avec description de nouvelles espèces - *Bull. Soc. zool. France*, 56, pp. 269-288, figs 1-4.